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(WO/2002/081588) WATER-REPELLENT FILM AND METHOD FOR PREPARING THE SAME, AND INK-JET HEAD AND INK-JET TYPE RECORDING DEVICE USING THE SAME

Biblio. Data Full Text National Phase Notices Documents

Latest bibliographic data on file with the International Bureau



Pub. No.: WO/2002/081588 International Application No.: PCT/JP2002/003247

Publication Date: 17.10.2002

International Filing Date: 01.04.2002

Chapter 2 Demand Filed: 12.08.2002

IPC: B05D 5/08 (2006.01), B32B 27/08 (2006.01), B41J 2/14 (2006.01), B41J 2/16 (2006.01), C09D 183/14 (2006.01), C09K 3/18 (2006.01), B05D 1/18 (2006.01)

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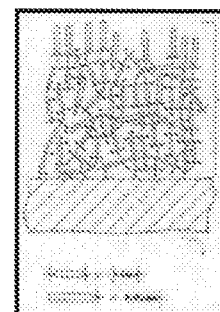
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Priority Data: 2001-103710 02.04.2001 JP
2001-104605 03.04.2001 JP
2001-385068 18.12.2001 JP

Title: WATER-REPELLENT FILM AND METHOD FOR PREPARING THE SAME, AND INK-JET HEAD AND INK-JET TYPE RECORDING DEVICE USING THE SAME

Abstract: A water-repellent film (1) formed on a solid base material (2), characterized in that it comprises a molecule (A) having at least one siloxane bond (-Si-O-) at both terminals thereof and a hydrocarbon chain in the middle portion thereof and a molecule (B) having a fluorocarbon chain at one terminal and at least one siloxane bond (-Si-O-) at the other terminal, and the molecule (A) and the molecule (B) together form a polymer film; an ink-jet head and an ink-jet type recording device having the water-repellent film. The polymer film is covalently bound with the surface of the solid base material through a siloxane bonding (-Si-O-) and the surface is wholly covered by fluorocarbon chains exhibiting high water repellency, which prevents the entry of an alkaline ion. Accordingly, the water-repellent film does not suffer fracture even when it is contacted with an ink having alkalinity for a long period of time.



Designated States:

AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW.
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Eurasian Patent Organization (EAPO) (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM)